

FILE 'REGISTRY' ENTERED AT 16:41:53 ON 02 FEB 2011

EXP LAMINARIPENTAOSE/CN

L1 2 S E3 OR E7 OR E9 OR E12

FILE 'HCAPLUS' ENTERED AT 16:42:43 ON 02 FEB 2011

L2 133 S L1

L3 8 S L1/THU

=> file reg		
COST IN U.S. DOLLARS	SINCE FILE	TOTAL
	ENTRY	SESSION
FULL ESTIMATED COST	0.23	0.23

FILE 'REGISTRY' ENTERED AT 14:33:15 ON 02 FEB 2011  
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STRUCTURE FILE UPDATES: 1 FEB 2011 HIGHEST RN 1261350-79-1  
 DICTIONARY FILE UPDATES: 1 FEB 2011 HIGHEST RN 1261350-79-1

New CAS Information Use Policies, enter HELP USAGETERMS for details.

TSCA INFORMATION NOW CURRENT THROUGH June 26, 2010.

Please note that search-term pricing does apply when conducting SmartSELECT searches.

REGISTRY includes numerically searchable data for experimental and predicted properties as well as tags indicating availability of experimental property data in the original document. For information on property searching in REGISTRY, refer to:

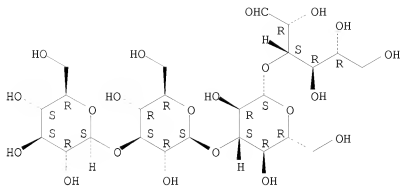
<http://www.cas.org/support/stngen/stndoc/properties.html>

=> s laminaritetraose/cn  
 L1 1 LAMINARITETRAOSE/CN

=> d l1

L1 ANSWER 1 OF 1 REGISTRY COPYRIGHT 2011 ACS on STN  
 RN 26212-72-6 REGISTRY  
 ED Entered STN: 16 Nov 1984  
 CN D-Glucose, O-β-D-glucopyranosyl-(1→3)-O-β-D-glucopyranosyl-(1→3)-O-β-D-glucopyranosyl-(1→3)- (CA INDEX NAME)  
 OTHER CA INDEX NAMES:  
 CN Laminaritetraose (6CI, 7CI, 8CI)  
 OTHER NAMES:  
 CN Laminara-tetraose  
 CN Laminaritetrose  
 FS STEREOSEARCH  
 MF C24 H42 O21  
 CI COM  
 LC STN Files: AGRICOLA, BIOSIS, CA, CAPLUS, CASREACT, CHEMCATS, REAXYSFILE\*, TOXCENTER, USPATFULL  
 (\*File contains numerically searchable property data)

Absolute stereochemistry.



\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

83 REFERENCES IN FILE CA (1907 TO DATE)  
 4 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA  
 83 REFERENCES IN FILE CAPLUS (1907 TO DATE)

=> s laminaripentaose/cn  
 L2 1 LAMINARIPENTAOSE/CN

=> s l2  
 L3 1 LAMINARIPENTAOSE/CN

=> d l2

L2 ANSWER 1 OF 1 REGISTRY COPYRIGHT 2011 ACS on STN

RN 23743-55-7 REGISTRY

ED Entered STN: 16 Nov 1984

CN D-Glucose, O- $\beta$ -D-glucopyranosyl-(1 $\rightarrow$ 3)-O- $\beta$ -D-glucopyranosyl-(1 $\rightarrow$ 3)-O- $\beta$ -D-glucopyranosyl-(1 $\rightarrow$ 3)-O- $\beta$ -D-glucopyranosyl-(1 $\rightarrow$ 3)- (CA INDEX NAME)

OTHER CA INDEX NAMES:

CN Laminaripentaose (6CI, 7CI, 8CI)

OTHER NAMES:

CN Laminarapentaose

CN Laminarapentose

CN Laminaripentose

FS STEREOSEARCH

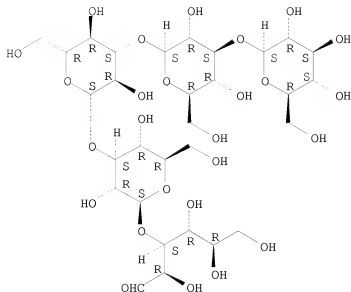
DR 24975-10-8, 87142-89-0

MF C30 H52 O26

CI COM

LC STN Files: AGRICOLA, BIOSIS, CA, CAPLUS, CASREACT, CHEMCATS,  
 REAXYSFILE\*, TOXCENTER, USPATFULL  
 (\*File contains numerically searchable property data)

Absolute stereochemistry.



\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

101 REFERENCES IN FILE CA (1907 TO DATE)  
 7 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA  
 101 REFERENCES IN FILE CAPLUS (1907 TO DATE)

=> d his

(FILE 'HOME' ENTERED AT 14:32:54 ON 02 FEB 2011)

FILE 'REGISTRY' ENTERED AT 14:33:15 ON 02 FEB 2011

L1 1 S LAMINARITETRAOSE/CN  
 L2 1 S LAMINARIPENTAOSE/CN  
 L3 1 S L2

=> log hold

COST IN U.S. DOLLARS	SINCE FILE	TOTAL
	ENTRY	SESSION
FULL ESTIMATED COST	22.42	22.65

SESSION WILL BE HELD FOR 120 MINUTES  
 STN INTERNATIONAL SESSION SUSPENDED AT 14:34:10 ON 02 FEB 2011

Connecting via Winsock to STN

Welcome to STN International! Enter x:X

LOGINID:SSPTAEXO1623

PASSWORD:

\*\*\*\*\* RECONNECTED TO STN INTERNATIONAL \*\*\*\*\*  
 SESSION RESUMED IN FILE 'REGISTRY' AT 14:35:08 ON 02 FEB 2011  
 FILE 'REGISTRY' ENTERED AT 14:35:08 ON 02 FEB 2011

COST IN U.S. DOLLARS	SINCE FILE ENTRY	TOTAL SESSION
FULL ESTIMATED COST	22.42	22.65

```
=> exp amyloetetraose/cn
E1      1      AMYLOSUCROSE (NEISSERIA POLYSACCHAREA CLONE PNB2) (EC 2.4.1.4)/CN
E2      1      AMYLOTERM/CN
E3      1 --> AMYLOTETRAOSE/CN
E4      1      AMYLOTEX/CN
E5      1      AMYLOTEX 7086/CN
E6      1      AMYLOTEX 8100/CN
E7      1      AMYLOTEX 8100P/CN
E8      1      AMYLOTEX ST 2000/CN
E9      1      AMYLOTEX ST 2100/CN
E10     1      AMYLOTRIOSE/CN
E11     1      AMYLOVORAN/CN
E12     1      AMYLOVORAN BIOSYNTHESIS AMSK (BACILLUS CEREUS STRAIN ATCC 14579 GENE BC5269)/CN
```

```
=> s e3
L4      1      AMYLOTETRAOSE/CN
```

```
=> d l4
```

```
L4      ANSWER 1 OF 1  REGISTRY  COPYRIGHT 2011 ACS on STN
RN      34612-38-9  REGISTRY
ED      Entered STN:  16 Nov 1984
CN      D-Glucose, O- $\alpha$ -D-glucopyranosyl-(1 $\rightarrow$ 4)-O- $\alpha$ -D-glucopyranosyl-(1 $\rightarrow$ 4)-O- $\alpha$ -D-glucopyranosyl-(1 $\rightarrow$ 4)- (CA INDEX NAME)
```

```
OTHER CA INDEX NAMES:
CN      Maltotetraose (6CI, 8CI)
```

```
OTHER NAMES:
```

```
CN       $\alpha$ -1,4-Tetraglucose
```

```
CN      Amyloetetraose
```

```
AR      1263-76-9
```

```
FS      STEREOSEARCH
```

```
MF      C24 H42 O21
```

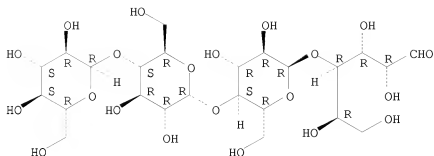
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CI      COM
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LC      STN Files:  AGRICOLA, ANABSTR, BIOSIS, BIOTECHNO, CA, CAPLUS, CASREACT, CHEMCATS, CHEMLIST, EMBASE, IFICDB, IFIPAT, IFIUDB, MEDLINE, MSDS-OHS, NAPRALERT, REAKYSFILE*, TOXCENTER, USPAT2, USPATFULL, USPATOLD
              (*File contains numerically searchable property data)
```

```
Other Sources:  EINECS**
```

```
              (**Enter CHEMLIST File for up-to-date regulatory information)
```

Absolute stereochemistry.



\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1400 REFERENCES IN FILE CA (1907 TO DATE)  
 53 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA  
 1406 REFERENCES IN FILE CAPLUS (1907 TO DATE)

=> exp cellotetraose/cn

E1	1	CELLOTTERM 025-12/CN
E2	1	CELLOTETRAITOL/CN
E3	1	--> CELLOTETRAOSE/CN
E4	1	CELLOTETRAOSE O-BENZYLOXIME/CN
E5	1	CELLOTETRAOSE O-METHYLOXIME/CN
E6	1	CELLOTETRAOSE OLEATE/CN
E7	1	CELLOTETRAOSE TETRADECAACETATE/CN
E8	1	CELLOTETRAOSE, A-, TETRADECAACETATE/CN
E9	1	CELLOTETRAOSE, B-/CN
E10	1	CELLOTETRAOSE, DIMER/CN
E11	1	CELLOTETRAOSE, LABELED WITH CARBON-14/CN
E12	1	CELLOTETRAOSE, TETRADECAACETATE, A-/CN

=> s e3

L5 1 CELLOTETRAOSE/CN

=> d 15

L5 ANSWER 1 OF 1 REGISTRY COPYRIGHT 2011 ACS on STN  
 RN 38819-01-1 REGISTRY  
 ED Entered STN: 16 Nov 1984  
 CN D-Glucose, O- $\beta$ -D-glucopyranosyl-(1 $\rightarrow$ 4)-O- $\beta$ -D-glucopyranosyl-(1 $\rightarrow$ 4)-O- $\beta$ -D-glucopyranosyl-(1 $\rightarrow$ 4)- (CA INDEX NAME)

OTHER CA INDEX NAMES:

CN Cellotetraose (6CI, 7CI, 8CI)

OTHER NAMES:

CN Cellotetrose

FS STEREOSEARCH

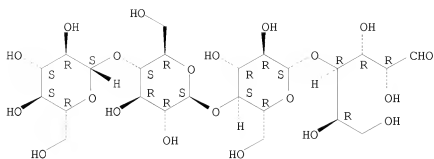
DR 2478-34-4, 146598-61-0

MF C24 H42 O21

CI COM

LC STN Files: AGRICOLA, ANABSTR, BIOSIS, CA, CAPLUS, CASREACT, CHEMCATS, CHEMLIST, MEDLINE, PIRA, REAXYSFILE\*, TOXCENTER, USPAT2, USPATFULL  
 (\*File contains numerically searchable property data)

Absolute stereochemistry.



\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

466 REFERENCES IN FILE CA (1907 TO DATE)  
 23 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA  
 467 REFERENCES IN FILE CAPLUS (1907 TO DATE)

=> log hold

COST IN U.S. DOLLARS

SINCE FILE

TOTAL

FULL ESTIMATED COST

ENTRY

SESSION

39.14

39.37

SESSION WILL BE HELD FOR 120 MINUTES

STN INTERNATIONAL SESSION SUSPENDED AT 14:36:04 ON 02 FEB 2011

Connecting via Winsock to STN

Welcome to STN International! Enter x:X

LOGINID:SSPTAEXO1623

PASSWORD:

TERMINAL (ENTER 1, 2, 3, OR ?):2

\*\*\*\*\* Welcome to STN International \*\*\*\*\*

NEWS	1		Web Page for STN Seminar Schedule - N. America
NEWS	2	OCT 04	Precision of EMBASE searching enhanced with new chemical name field
NEWS	3	OCT 06	Increase your retrieval consistency with new formats or for Taiwanese application numbers in CA/CAPLUS.
NEWS	4	OCT 21	CA/CAPLUS kind code changes for Chinese patents increase consistency, save time
NEWS	5	OCT 22	New version of STN Viewer preserves custom highlighting of terms when patent documents are saved in .rtf format
NEWS	6	OCT 28	INPADOCDB/INPAFAMDB: Enhancements to the US national patent classification.
NEWS	7	NOV 03	New format for Korean patent application numbers in CA/CAPLUS increases consistency, saves time.

NEWS 8 NOV 04 Selected STN databases scheduled for removal on  
December 31, 2010

NEWS 9 NOV 18 PROUSDDR and SYNTHLINE Scheduled for Removal  
December 31, 2010 by Request of Prous Science

NEWS 10 NOV 22 Higher System Limits Increase the Power of STN  
Substance-Based Searching

NEWS 11 NOV 24 Search an additional 46,850 records with MEDLINE  
backfile extension to 1946

NEWS 12 DEC 14 New PNK Field Allows More Precise Crossover among STN  
Patent Databases

NEWS 13 DEC 18 ReaxysFile available on STN

NEWS 14 DEC 21 CAS Learning Solutions -- a new online training experience

NEWS 15 DEC 22 Value-Added Indexing Improves Access to World Traditional  
Medicine Patents in CAPlus

NEWS 16 JAN 24 The new and enhanced DPCI file on STN has been released

NEWS 17 JAN 26 Improved Timeliness of CAS Indexing Adds Value to  
USPATFULL and USPAT2 Chemistry Patents

NEWS 18 JAN 26 Updated MeSH vocabulary, new structured abstracts, and  
other enhancements improve searching in STN reload of  
MEDLINE

NEWS 19 JAN 28 CABA will be updated weekly

NEWS EXPRESS FEBRUARY 15 10 CURRENT WINDOWS VERSION IS V8.4.2,  
AND CURRENT DISCOVER FILE IS DATED 07 JULY 2010.

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\* \* \* \* \* STN Columbus \* \* \* \* \*

FILE 'HOME' ENTERED AT 16:41:44 ON 02 FEB 2011

=> file reg		
COST IN U.S. DOLLARS	SINCE FILE	TOTAL
	ENTRY	SESSION
FULL ESTIMATED COST	0.23	0.23

FILE 'REGISTRY' ENTERED AT 16:41:53 ON 02 FEB 2011  
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STRUCTURE FILE UPDATES: 1 FEB 2011 HIGHEST RN 1261350-79-1  
DICTIONARY FILE UPDATES: 1 FEB 2011 HIGHEST RN 1261350-79-1

New CAS Information Use Policies, enter HELP USAGETERMS for details.

TSCA INFORMATION NOW CURRENT THROUGH June 26, 2010.



Please note that search-term pricing does apply when conducting SmartSELECT searches.

REGISTRY includes numerically searchable data for experimental and predicted properties as well as tags indicating availability of experimental property data in the original document. For information on property searching in REGISTRY, refer to:

<http://www.cas.org/support/stngen/stdoc/properties.html>

=> exp laminaripentaose/cn

```
E1      1      LAMINARIOSE/CN
E2      1      LAMINARIPENTAHYDROLASE/CN
E3      1 -->  LAMINARIPENTAOSE/CN
E4      1      LAMINARIPENTAOSE ALDITOL/CN
E5      1      LAMINARIPENTAOSE SULFATE/CN
E6      1      LAMINARIPENTAOSE, HEPTADECACETATE, B-/CN
E7      1      LAMINARIPENTOSE/CN
E8      1      LAMINARITETRAONIC ACID/CN
E9      1      LAMINARITETRAOSE/CN
E10     1      LAMINARITETRAOSE ALDITOL/CN
E11     1      LAMINARITETRAOSE, TETRADECACETATE/CN
E12     1      LAMINARITETROSE/CN
```

=> s e3 or e7 or e9 or e12

```
      1 LAMINARIPENTAOSE/CN
      1 LAMINARIPENTOSE/CN
      1 LAMINARITETRAOSE/CN
      1 LAMINARITETROSE/CN
L1     2 LAMINARIPENTAOSE/CN OR LAMINARIPENTOSE/CN OR LAMINARITETRAOSE/CN
      OR LAMINARITETROSE/CN
```

=> d l1 1-2

```
L1  ANSWER 1 OF 2  REGISTRY  COPYRIGHT 2011 ACS on STN
RN   26212-72-6  REGISTRY
ED   Entered STN: 16 Nov 1984
CN   D-Glucose, O-β-D-glucopyranosyl-(1→3)-O-β-D-
      glucopyranosyl-(1→3)-O-β-D-glucopyranosyl-(1→3)- (CA
      INDEX NAME)
```

OTHER CA INDEX NAMES:

CN Laminaritetraose (6CI, 7CI, 8CI)

OTHER NAMES:

CN Laminara-tetraose

CN Laminaritetrose

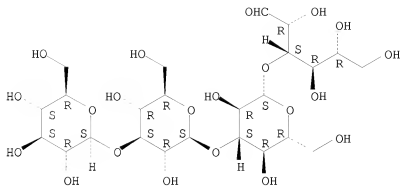
FS STEREOSEARCH

MF C24 H42 O21

CI COM

LC STN Files: AGRICOLA, BIOSIS, CA, CAPLUS, CASREACT, CHEMCATS,  
REAXYSFILE\*, TOXCENTER, USPATFULL  
(\*File contains numerically searchable property data)

Absolute stereochemistry.

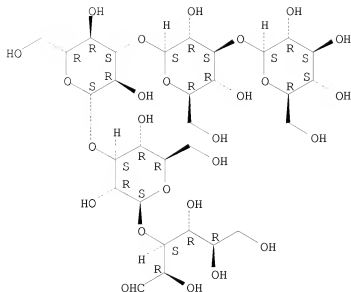


\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

83 REFERENCES IN FILE CA (1907 TO DATE)  
 4 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA  
 83 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L1 ANSWER 2 OF 2 REGISTRY COPYRIGHT 2011 ACS on STN  
 RN 23743-55-7 REGISTRY  
 ED Entered SIN: 16 Nov 1984  
 CN D-Glucose, O- $\beta$ -D-glucopyranosyl-(1 $\rightarrow$ 3)-O- $\beta$ -D-glucopyranosyl-(1 $\rightarrow$ 3)-O- $\beta$ -D-glucopyranosyl-(1 $\rightarrow$ 3)-O- $\beta$ -D-glucopyranosyl-(1 $\rightarrow$ 3)- (CA INDEX NAME)  
 OTHER CA INDEX NAMES:  
 CN Laminaripentaose (6CI, 7CI, 8CI)  
 OTHER NAMES:  
 CN Laminarapentaose  
 CN Laminarapentose  
 CN Laminaripentose  
 FS STEREOSEARCH  
 DR 24975-10-8, 87142-89-0  
 MF C30 H52 O26  
 CI COM  
 LC STN Files: AGRICOLA, BIOSIS, CA, CAPLUS, CASREACT, CHEMCATS, REAXYSFILE\*, TOXCENTER, USPATFULL  
 (\*File contains numerically searchable property data)

Absolute stereochemistry.



\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

101 REFERENCES IN FILE CA (1907 TO DATE)  
 7 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA  
 101 REFERENCES IN FILE CAPLUS (1907 TO DATE)

=> file hcaplus

COST IN U.S. DOLLARS

SINCE FILE

TOTAL

ENTRY

SESSION

FULL ESTIMATED COST

27.61

27.84

FILE 'HCAPLUS' ENTERED AT 16:42:43 ON 02 FEB 2011

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FILE COVERS 1907 - 2 Feb 2011 VOL 154 ISS 6

FILE LAST UPDATED: 1 Feb 2011 (20110201/ED)

REVISED CLASS FIELDS (/NCL) LAST RELOADED: Oct 2010

USPTO MANUAL OF CLASSIFICATIONS THESAURUS ISSUE DATE: Oct 2010

HCAplus now includes complete International Patent Classification (IPC) reclassification data for the fourth quarter of 2010.

CAS Information Use Policies apply and are available at:

<http://www.cas.org/legal/infopolicy.html>

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> s l1

L2 133 L1

=> s l1/thu

133 L1  
1344890 THU/RL

L3 8 L1/THU  
(L1 (L) THU/RL)

=> d l3 1-8 ti abs bib

L3 ANSWER 1 OF 8 HCAPLUS COPYRIGHT 2011 ACS on STN

TI Oligomeric compounds and excipients

AB The present invention provides method of optimizing the efficacy and potency of antisense compds. In certain embodiments, the invention provides assays useful for determining favorable oligonucleotide characteristics and excipients for improved cellular uptake.

AN 2010:1002623 HCAPLUS <<LOGINID::20110202>>

DN 153:343486

TI Oligomeric compounds and excipients

IN Bennett, C. Frank; Geary, Richard S.; Swayze, Eric E.; Siwkowski, Andrew M.

PA Isis Pharmaceuticals, Inc., USA

SO PCT Int. Appl., 69pp.

CODEN: PIXXD2

DT Patent

LA English

FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2010091301	A1	20100812	WO 2010-US23383	20100205
	W: AE, AG, AL, AM, AO, AT, AU, AZ, BA, BB, BG, BH, BR, BW, BY, BZ, CA, CH, CL, CN, CO, CR, CU, CZ, DE, DK, DM, DO, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR, KZ, LA, LC, LK, LR, LS, LT, LU, LY, MA, MD, ME, MG, MK, MN, MW, MX, MY, MZ, NA, NG, NI, NO, NZ, OM, PE, PG, PH, PL, PT, RO, RS, RU, SC, SD, SE, SG, SK, SL, SM, ST, SV, SY, TH, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, ZA, ZM, ZW				
	RW: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HR, HU, IE, IS, IT, LT, LU, LV, MC, MK, MT, NL, NO, PL, PT, RO, SE, SI, SK, SM, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG, BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				

PRAI US 2009-150708P P 20090206

RE.CNT 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L3 ANSWER 2 OF 8 HCAPLUS COPYRIGHT 2011 ACS on STN

TI Synthesis, immunological activities, and scavenging ability toward superoxide anion of (1 → 3)-β-D-pentagluconides and its epoxyalkyl derivatives

AB Two epoxyalkyl (1→3)-β-D-pentagluconides were synthesized via acetylation, glycosidation, oxidation, and deacetylation of (1→3)-β-D-pentagluconide. The immunol. activities (superoxide

anion production activity, phagocytic activity, and lymphocyte proliferation) and scavenging ability toward superoxide anion of (1→3)-β-D-pentaglucoside and its epoxyalkyl derivs. were compared. Superoxide anion released from human blood monocytes was measured by the reduction of ferricytochrome c. Phagocytosis by peritoneal macrophages was detected through a teal ingesting that measured the chicken red blood cells (CRBC). Lymphocyte proliferation was determined by the MTT method. The scavenging ability toward superoxide anions was evaluated by means of chemiluminescence (CL). The results showed that epoxyalkyl (1→3)-β-D-pentaglucosides had a little higher immunol. activity and scavenging ability toward superoxide anion than (1→3)-β-D-pentaglucoside, which indicated that the reducing end of the oligoglucosides was quite important for maximum biol. activity.

AN 2005:464987 HCAPLUS <<LOGINID:20110202>>  
DN 143:90258

TI Synthesis, immunological activities, and scavenging ability toward superoxide anion of (1 → 3)-β-D-pentaglucoside and its epoxyalkyl derivatives

AU Huang, Gang-Liang; Liu, Man-Xi; Mei, Xin-Ya; Wang, Ying  
CS Key Laboratory of Biomedical Photonics of Ministry of Education, Huazhong University of Science and Technology (East Campus), Wuhan, 430074, Peop. Rep. China

SO Bioorganic & Medicinal Chemistry (2005), 13(12), 3873-3877  
CODEN: BMECEP; ISSN: 0968-0896

PB Elsevier Ltd.

DT Journal

LA English

OS CASREACT 143:90258

OSC.G 3 THERE ARE 3 CAPLUS RECORDS THAT CITE THIS RECORD (3 CITINGS)

RE.CNT 20 THERE ARE 20 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L3 ANSWER 3 OF 8 HCAPLUS COPYRIGHT 2011 ACS ON STN

TI Therapeutical treatment with oligo-beta- (1,3) -glucans, drugs used in said treatment

AB A therapeutical method comprising administration of a composition comprising an amount of oligo-β-(1,3)-glucan and a pharmaceutically acceptable carrier, to a human being or to a warm-blood animal suffering from a disease selected from the group consisting in a tumor, a cancer, a viral disease, a bacterial disease, a fungal disease, a disease of the immune system, an auto-immune disease or a disease related to a deficiency of immunostimulation, wherein the amount of oligo-β-(1,3)-glucan is effective to treat the disease.

AN 2005:259652 HCAPLUS <<LOGINID:20110202>>

DN 142:309889

TI Therapeutical treatment with oligo-beta- (1,3) -glucans, drugs used in said treatment

IN Yvin, Jean-Claude; Jamois, Frank; Vetvicka, Vaclav  
PA Fr.

SO U.S. Pat. Appl. Publ., 20 pp.

CODEN: USXXCO

DT Patent

LA English

FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	US 20050065114	A1	20050324	US 2003-668665	20030923
	WO 2005027936	A2	20050331	WO 2004-EP10995	20040916
	WO 2005027936	A3	20050728		
	W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD,				

GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC,  
 LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI,  
 NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY,  
 TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW  
 RW: BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM,  
 AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK,  
 EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PL, PT, RO, SE,  
 SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE,  
 SN, TD, TG

EP 1663258 A2 20060607 EP 2004-787077 20040916

R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT,  
 IE, SI, FI, RO, CY, TR, BG, CZ, EE, HU, PL, SK

PRAI US 2003-668665 A 20030923

WO 2004-EP10995 W 20040916

OSC.G 2 THERE ARE 2 CAPLUS RECORDS THAT CITE THIS RECORD (2 CITINGS)

L3 ANSWER 4 OF 8 HCAPLUS COPYRIGHT 2011 ACS ON STN

TI Characterisation of the Anticoagulant Properties of a Range of  
 Structurally Diverse Sulfated Oligosaccharides

AB In this study, 17 sulfated oligosaccharides were assessed by the activated  
 partial thromboplastin time (APTT) test for their anticoagulant activity  
 and nine were found to exhibit significant activity. Chain length,  
 monosaccharide makeup, and linkage all appear to be critical factors in  
 determining

anticoagulant activity, with the most active compds. being five- to  
 sixfold less potent than unfractionated heparin (UFH).  
 Phosphomannopentase sulfate (PI-88), one of the most active sulfated  
 oligosaccharides and a promising anticancer drug, was selected for further  
 study. PI-88 gave a more linear APTT dose-response curve and displayed  
 less patient-to-patient variation than UFH, with its activity being  
 neutralized by protamine sulfate. However, PI-88 showed considerable  
 species-to-species variation in its anticoagulant effect. It was found  
 that PI-88 acted as an anticoagulant by enhancing the ability of heparin  
 cofactor II (HCII) to inhibit thrombin, and did not act via antithrombin  
 III (AT-III) in either inhibiting Factor Xa or thrombin. PI-88 also  
 mildly prolonged the prothrombin time (PT), while it had no platelet  
 pro-aggregatory activity, nor did it demonstrate direct fibrinolytic  
 activity. Thus, PI-88 represents a potential antithrombotic agent  
 deserving further study.

AN 2001:651835 HCAPLUS <<LOGINID:20110202>>

DN 136:63816

TI Characterisation of the Anticoagulant Properties of a Range of  
 Structurally Diverse Sulfated Oligosaccharides

AU Wall, D.; Douglas, S.; Ferro, V.; Cowden, W.; Parish, C.

CS Research and Development Unit, Australian Red Cross Blood

Service-Victoria, Melbourne, Australia

SO Thrombosis Research (2001), 103(4), 325-335

CODEN: THBRAA; ISSN: 0049-3848

PB Elsevier Science Inc.

DT Journal

LA English

OSC.G 25 THERE ARE 25 CAPLUS RECORDS THAT CITE THIS RECORD (25 CITINGS)

RE.CNT 32 THERE ARE 32 CITED REFERENCES AVAILABLE FOR THIS RECORD  
 ALL CITATIONS AVAILABLE IN THE RE FORMAT

L3 ANSWER 5 OF 8 HCAPLUS COPYRIGHT 2011 ACS ON STN

TI Oligosaccharides, a process for preparation thereof and pharmaceutical  
 combination containing the same compounds

AB This invention relates to the oligosaccharides with enhancing immune and  
 antitumor activity. The described oligosaccharides have a main chain  
 consisting of 3-14 sugar residues and side chains consisting of 0-4 sugar

residues. The sugar residues are either the same or different. The described sugar residues on the main chain are linked through 1-3 $\beta$  or 1-4 $\beta$  linkage. The described side chains are linked with the main chain through 1-6 $\beta$  or 1-6 $\alpha$  linkage. The described terminal group is hydroxyl or C1-12 alkoxyl group. This invention also involves the preparation of the described oligosaccharides, in the process 1,2:5,6-di-O-isopropylidene glucose is used as the starting material and the glycosyl acceptor and acylated sugars are used as the glycosyl donors for the preparation of said oligosaccharide. In addition, the pharmaceutical composition of the described oligosaccharides and their use as enhancing immune and antitumor agents, and as health maintaining products are involved.

AN 2001:453081 HCAPLUS <<LOGINID:20110202>>  
 DN 135:33006  
 TI Oligosaccharides, a process for preparation thereof and pharmaceutical combination containing the same compounds  
 IN Kong, Fanzuo; Ning, Jun  
 PA Research Center for Eco-Environmental Sciences, Academia Sinica, Peop. Rep. China  
 SO PCT Int. Appl., 36 pp.  
 CODEN: PIXXD2  
 DT Patent  
 LA Chinese  
 FAN.CNT 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI WO 2001044263	A1	20010621	WO 2000-CN224	20000807
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
CN 1303857	A	20010718	CN 1999-126224	19991216
CN 1129600	C	20031203		
CN 1306003	A	20010801	CN 2000-100376	20000119
CN 1159327	C	20040728		
PRAI CN 1999-126224	A	19991216		
CN 2000-100376	A	20000119		
OSC.G 3	THERE ARE 3 CAPLUS RECORDS THAT CITE THIS RECORD (3 CITINGS)			
RE.CNT 4	THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD ALL CITATIONS AVAILABLE IN THE RE FORMAT			

L3 ANSWER 6 OF 8 HCAPLUS COPYRIGHT 2011 ACS ON STN  
 TI  $\beta$ (1-3)-Glucan diagnostic assays  
 AB Methods of isolating  $\beta$ (1-3)-glucan or  $\beta$ (1-3)-glucan-containing organisms in a sample, or of detecting the presence of  $\beta$ (1-3)-glucan or  $\beta$ (1-3)-glucan-containing organisms in a sample, utilizing binding agents for  $\beta$ (1-3)-glucan, such as LacCer, GalCer, globotriaosylceramide and asialoganglioside-GM1, are described. Methods of diagnosing fungal infection, by detecting  $\beta$ (1-3)-glucan or  $\beta$ (1-3)-glucan-containing organisms, are also described. Antibodies and kits useful in the methods are also disclosed.  
 AN 1999:405173 HCAPLUS <<LOGINID:20110202>>  
 DN 131:43592  
 TI  $\beta$ (1-3)-Glucan diagnostic assays  
 IN Wakshull, Eric M.; Mackin, William M.; Zimmerman, Janet W.; Fiset, Leslie W.  
 PA Alpha-Beta Technology, Inc., USA

SO PCT Int. Appl., 56 pp.  
 CODEN: PIXXD2  
 DT Patent  
 LA English  
 FAN.CNT 6

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 9931510	A1	19990624	WO 1998-US24014	19981112
	W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TM, TR, TT, UA, UG, US, UZ, VN, YU, ZW				
	RW: GH, GM, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG				
	US 6084092	A	20000704	US 1997-990125	19971212
	CA 2314342	A1	19990624	CA 1998-2314342	19981112
	AU 9913967	A	19990705	AU 1999-13967	19981112
	AU 740158	B2	20011101		
	EP 1038180	A1	20000927	EP 1998-957794	19981112
	R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, FI				
	JP 2002508518	T	20020319	JP 2000-539356	19981112
PRAI	US 1997-990125	A	19971212		
	US 1997-797696	A2	19970131		
	WO 1997-US7445	A2	19970501		
	WO 1998-US24014	W	19981112		

ASSIGNMENT HISTORY FOR US PATENT AVAILABLE IN LSUS DISPLAY FORMAT  
 OSC.G 2 THERE ARE 2 CAPLUS RECORDS THAT CITE THIS RECORD (2 CITINGS)  
 RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD  
 ALL CITATIONS AVAILABLE IN THE RE FORMAT

L3 ANSWER 7 OF 8 HCAPLUS COPYRIGHT 2011 ACS ON STN  
 TI Immunosuppressants containing heated carbohydrates having  
 β-1,3-glucoside linkage  
 AB Immunosuppressants contain heat-treated linear carbohydrates having  
 β-1,3-glucoside linkage, e.g. curdlan hydrolyzates, as active  
 ingredients. The action of immunosuppressants is based on suppression of  
 lymphocytes. Curdlan hydrolyzates, prepared by decomposition of curdlan with  
 HCO<sub>2</sub>H and subsequent heating in H<sub>2</sub>O at 100° for 10 min,  
 significantly decreased nos. of viable B- and T-lymphocytes in incubation  
 under stimulation with LPS and ConA, resp.  
 AN 1998:479907 HCAPLUS <<LOGINID:20110202>>  
 DN 129:104215  
 OREF 129:21281a,21284a  
 TI Immunosuppressants containing heated carbohydrates having  
 β-1,3-glucoside linkage  
 IN Kajikawa, Akihiro; Kamenoi, Masaki; Murosaki, Shinji; Kusaka, Hiroaki  
 PA Takeda Chemical Industries, Ltd., Japan; Takeda Shokuhin Kogyo K. K.;  
 Kirin Food-Tech Co., Ltd.  
 SO Jpn. Kokai Tokkyo Koho, 6 pp.  
 CODEN: JKXXAF  
 DT Patent  
 LA Japanese  
 FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	JP 10194976	A	19980728	JP 1997-6524	19970117
	JP 4091137	B2	20080528		
PRAI	JP 1997-6524		19970117		



OSC.G 1 THERE ARE 1 CAPLUS RECORDS THAT CITE THIS RECORD (1 CITINGS)

L3 ANSWER 8 OF 8 HCAPLUS COPYRIGHT 2011 ACS ON STN

TI Structure and activity of sulfated alkyl oligosaccharide having potent anti-HIV activity

AB Hydrolysis in dilute HCl/DMSO of curdlan gave mixture of laminari-oligosaccharides, which by column chromatog. with charcoal/EtOH-H<sub>2</sub>O gave laminaritetraose (I). Biochem. selective anal. by enzyme of curdlan gave laminaripentaose (II). Treatment of pure I with AcOK/Ac<sub>2</sub>O gave peracetylated laminaritetraoside (III) ( $\beta/\alpha$  ratio 3.2-3.8), which with alkyl alcs. by SnCl<sub>4</sub> catalyst gave peracetylated alkyl laminaritetraosides, V, VI, VII and VIII in 45, 55, 54 and 28 % yields, resp. Similarly, pure II gave peracetylated laminaripentaoside (IV), which with alkyl alcs. similarly gave peracetylated alkyl laminaripentaosides IX, X, XI, XII and XIII in 50, 54, 47, 55 and 70% yields, resp. Sulfated alkyl laminaritetraosides XIV, XV, XVI and XVII were synthesized by treatment of, V, VI, VII and VIII treated with NaOMe/MeOH, with N-SO<sub>3</sub>/Pyridine. Similarly, sulfated alkyl laminaripentaosides XVIII, XIX, XX and XXII were synthesized. The anti-HIV activity of XIV-XXII was measured by using curdlan sulfate as reference. The anti-HIV activity of XIV-XVII decreased with shortening of alkyl portion under 8 of carbonic number EC<sub>50</sub> value of XIV and XV was 24 and 14  $\mu$ g/mL, resp. EC<sub>50</sub> value of XVI and XVII was 3.2 and 3.3  $\mu$ g/mL, resp., which was significantly lower than that of XVIII-XXII, resp. Structure of laminarioligosaccharides having more than pentasaccharides was important for high potent anti-HIV activity. XVIII and XIX having (+)-2-octyl and (-)-2-octyl portion, especially, both showed similar anti-HIV activity. Cytotoxic effect of all compds. tested was low. Usefulness of laminaripentaosides is discussed as anti-HIV active agents.

AN 1996:353110 HCAPLUS <<LOGINID:20110202>>

DN 125:104236

OREF 125:19219a,19222a

TI Structure and activity of sulfated alkyl oligosaccharide having potent anti-HIV activity

AU Katsuraya, Kaname; Uryu, Toshiyuki

CS Inst. Ind. Sci., Univ. Tokyo, Tokyo, 106, Japan

SO Seisan Kenkyu (1996), 48(3), 165-8

CODEN: SEKEAI; ISSN: 0037-105X

PB Tokyo Daigaku Seisan Gijutsu Kenkyusho

DT Journal

LA Japanese